WE CLAIM:

1. A single-part photographic bleach-fixing precursor composition having a pH of from about 4 to about 10 and comprising

at least 0.05 mol/l of one or more iron-ligand complexes,

at least 0.15 mol/l of one or more thiosulfates as the sole photographic fixing agents, and

optionally one or more sulfites,

provided that over 50 mol % of the iron present in said precursor composition is in the form of Fe(II).

2. The precursor composition of claim 1 having a pH of from about 4.5 to about 8.

3. The precursor composition of claim 1 comprising from about 0.15 to about 0.75 mol/l of one or more iron complexes.

4. The precursor composition of claim 1 comprising at least one iron complex comprising an aminopolycarboxylic acid or polyaminopolycarboxylic acid, or salt thereof.

5. The precursor composition of claim 4 comprising at least one iron complex that comprises a biodegradable aminopolycarboxylic acid or polyaminopolycarboxylic acid, or salt thereof.

6. The precursor composition of claim 1 comprising an iron complex that comprises a ligand selected from the group consisting of ethylenediaminetetraacetic acid, propylenediaminetetraacetic acid, ethylenediaminedisuccinic acid, methyliminodiacetic acid, alaninediacetic acid, nitrilotriacetic acid, ethylenediaminemonosuccinic acid, 2,6-pyridinedicarboxylic acid, and salts thereof.

7. The precursor composition of claim 1 comprising sodium thiosulfate, potassium thiosulfate, ammonium thiosulfate, or mixtures of any of these.

8. The precursor composition of claim 1 wherein more than 50 mol % or the total cations are ammonium ions.

9. The precursor composition of claim 1 wherein said sole photographic thiosulfate fixing agent is present in an amount of from about 0.75 to about 3 mol/l.

10. The precursor composition of claim 1 comprising from about 0.05 to about 2 mol/l of said sulfite.

11. The precursor composition of claim 1 wherein at least 65 mol % of the iron present therein is in the form of Fe(II).

12. The precursor composition of claim 11 wherein from about 70 to 100 mol % of the iron present therein is in the form of Fe(II).

13. The precursor composition of claim 1 further comprising at least 0.1 mol/l of one or more carboxylic acids as buffer(s).

14. The precursor composition of claim 13 comprising acetic acid, succinic acid, glycolic acid, maleic acid, propionic acid, malic acid, benzoic acid, or any mixture of these acids.

15. A single-part, concentrated photographic bleach-fixing precursor composition having a pH of from about 4.5 to about 8 and comprising:

from about 0.15 to about 0.75 mol/l of one or more iron-ligand complexes, said iron complexes comprising a ligand selected from the group consisting of ethylenediaminetetraacetic acid, propylenediaminetetraacetic acid, ethylenediaminedisuccinic acid, methyliminodiacetic acid, alaninediacetic acid, nitrilotriacetic acid, ethylenediaminemonosuccinic acid, 2,6-pyridinedicarboxylic acid, and salts thereof,

from about 0.75 to about 3 mol/l of potassium thiosulfate, sodium thiosulfate, or ammonium thiosulfate as the sole photographic fixing agent,

from about 0.05 to about 2 mol/l of one or more sulfites, and

from about 0.1 to about 1 mol/l of acetic acid, succinic acid, glycolic acid, maleic acid, propionic acid, malic acid, benzoic acid, or any mixture of these acids,

provided from about 70 to 100 mol % of the iron present in said composition is in the form of Fe(II).

16. A method of providing a color photographic image comprising:

A) color developing an imagewise exposed color photographic silver halide material,

B) contacting said color developed color photographic silver halide material with a bleach-fixing solution for sufficient time to remove at least 95% of the silver in said color developed color photographic silver halide material, and

C) replenishing said bleach-fixing solution by adding to it a bleach-fixing replenisher solution prepared by mixing:

overflow from said bleach-fixing solution or water, and

a single-part photographic bleach-fixing precursor composition having a pH of from about 4 to about 10 and comprising

at least 0.05 mol/l of one or more iron-ligand complexes,

at least 0.15 mol/l of one or more thiosulfates as the sole photographic fixing agents, and

optionally one or more sulfites,

provided more than 50 mol % of the iron present in said precursor composition is in the form of Fe(II),

wherein the mixed volume ratio of said overflow or water to said single-part bleach-fixing precursor composition is from about 50:1 to about 1:1.

17. The method of claim 16 wherein the mixed volume ratio of said overflow or water to said single-part photographic bleach-fixing precursor composition is from about 15:1 to about 3:1.

18. The method of claim 16 wherein said photographic silver halide material is a color photographic paper.

19. A method of regenerating a spent bleach-fixing solution comprising mixing:

a spent bleach-fixing solution, and

a single-part photographic bleach-fixing precursor composition having a pH of from about 4 to about 10 and comprising

at least 0.05 mol/l of one or more iron-ligand complexes,

at least 0.15 mol/l of one or more thiosulfates as the sole photographic fixing agents, and

optionally one or more sulfites,

provided more than 50 mol % of the iron present in said single-part, concentrated photographic bleach-fixing precursor composition is in the form of Fe(II),

wherein the mixed volume ratio of said spent bleach-fixing solution to said single-part photographic bleach-fixing precursor composition is from about 50:1 to about 1:1.

20. A method of providing a color image comprising contacting an imagewise exposed, color developed color photographic silver halide material with the single-part photographic bleach-fixing precursor composition of claim 1, diluted or undiluted, provided that prior to or during said contact, sufficient amounts of Fe (II) in said bleach-fixing precursor composition are oxidized to Fe (III) in order to bleach said imagewise exposed, color developed color photographic silver halide material.

21. The method of claim 20 wherein said Fe (II) is oxidized to Fe (III) by addition of an oxidizing agent, aeration, or both.

22. A photographic processing kit comprising:

a) a single-part photographic bleach-fixing precursor composition having a pH of from about 4 to about 10 and comprising:

at least 0.05 mol/l of one or more iron-ligand complexes,

at least 0.15 mol/l of one or more thiosulfates as the sole photographic fixing agents, and

optionally one or more sulfites,

provided more than 50 mol% of the iron present in said single-part photographic bleach-fixing precursor composition is in the form of Fe(II), and

b) either a composition comprising a Fe(III)-ligand complex, a composition comprising a ferrous ion oxidant, or both compositions.

23. A photographic processing kit comprising:

a) a single-part photographic bleach-fixing precursor composition having a pH of from about 4 to about 10 and comprising:

at least 0.05 mol/l of one or more iron-ligand complexes,

at least 0.15 mol/l of one or more thiosulfates as the sole photographic fixing agents, and

optionally mol/l of one or more sulfites as the sole preservatives for said thiosulfate(s),

provided more than 50 mol% of the iron present in said single-part, concentrated bleach-fixing precursor composition is in the form of Fe(II), and

b) one or more additional photographic processing compositions.

24. A single-use processing kit that comprises at least the following multiple photographic photoprocessing liquid concentrates, each concentrate having a volume designed for dilution to the same predetermined volume of working strength photographic processing solution:

a) a single-part, concentrated photographic bleach-fixing precursor composition having a pH of from about 4 to about 10 and comprising:

at least 0.05 mol/l of one or more iron-ligand complexes,

at least 0.15 mol/l of one or more thiosulfates as the sole photographic fixing agents, and

optionally, one or more sulfites,

provided more than 50 mol% of the iron present in said single-part, concentrated bleach-fixing precursor composition is in the form of Fe(II),

b) single-part or two-part photographic color developing concentrate compositions,

c) a single-part photographic final rinsing or stabilizing concentrate composition, and optionally,

d) a single-part composition comprising a Fe(III)-ligand complex, a composition comprising a ferrous ion oxidant, or both compositions.